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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/274,953	03/23/1999	ITZIK BEN-BASSAT	1576/1	9162

7590 09/12/2002

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EXAMINER

HUYNH, SON P

ART UNIT	PAPER NUMBER
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2611

DATE MAILED: 09/12/2002

to 3

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/274,953

Applicant(s)

BEN-BASSAT ET AL.

Examiner

Son P Huynh

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 03 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 23 March 1999.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-23 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-23 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 23 March 1999 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☒ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____
- 4) ☐ Interview Summary (PTO-413) Paper No(s) _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 10, 16 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

“the signals” in claim 10 (line 1) and claim 16 (line 2) lacks of antecedent basis.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) do not apply to the examination of this application as the application being examined was not (1) filed on or after November 29, 2000, or (2) voluntarily

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published under 35 U.S.C. 122(b). Therefore, this application is examined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

4. Claims 1, 5-6, 10, 15-16, 17, 21 are rejected under 35 U.S.C. 102(e) as being anticipated by Naiff (US 5,982,363).

Regarding claim 1, Naiff discloses a transmitter card 40 for a personal computer 20, comprising:

a circuit board which plugs into the personal computer and which is coupled to exchange data via an industry-standard bus (PCI) in the personal computer (see figure 3); Naiff further discloses the peripheral card comprises components such as a tuner with associated television signal processing circuit which tunes to requested channel based on the signal input from the remote control, the selected channel is accessed by access control circuitry; audio/video decompression circuitry; video and audio multiplexers; upconverter for outputting RF signal to user's television (see col. 5, lines 49-60). In addition, Naiff discloses the telephone return port 64 of peripheral card 40 communicates to service provider using RF return path (see col. 8, lines 6-13) and peripheral card 40 communicates to the television using RF signal transmission (see col. 9, lines 19-42). Inherently, the peripheral card 40 comprises a radio frequency modulator circuitry on the circuit board that receives the data and transmits radio frequency signals responsive thereto.

Regarding claim 5, Naiff discloses the television interface card 40 is coupled to an external antenna system 102 (see col. 9, lines 23-25 and figure 4) and comprising a connector 60 (see figure 3 and col. 60-63); and the television interface peripheral card using power supply from the PC (see col. 5, lines 42-46). Inherently, the DC source external to the card powers the antenna system.

Regarding claim 6, Naiff discloses the RF signal is transmitted by transceiver to the television appliance via TV direct port 60 (see col.9, lines 20-27). Inherently, the frequency modulation circuitry is coupled to convey the radio frequency signal to the antenna system via the connector.

Regarding claim 10, Naiff discloses the signals are transmitted to a satellite (see figure 4).

Regarding claim 15, the elements of the method correspond to the element of the transmitter card being claimed in claim 1 and are analyzed as discussed with respect to the rejection of claim 1.

Regarding claim 16, Naiff discloses the application software resident in the PC controls various functions of the card; the application software also used to tune to channels requested by a user via remote control (see col. 6, lines 57-63). Inherently, the conveying data to the card comprises determining a frequency band of the signal.

Regarding claim 17, the elements of the method being claimed correspond to the elements of the transmitter card being claimed in claim 5 and are analyzed as discussed in the rejection of claim 5.

Regarding claim 21, the elements of the method being claimed correspond to the elements of the card being claimed in claim 10 and are analyzed as discussed in the rejection of claim 10.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 2-4 are rejected under 35 U.S.C. 103(a) as being unpatentable over Naiff (US 5,982,363) as applied to claim 1 above, and in view of Cirineo (US 5,982,167).

Regarding claim 2, Naiff discloses a transmitter card as discussed in the rejection of claim 1. Naiff further discloses the peripheral card comprises components such as a tuner with associated television signal processing circuit which tunes to requested

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channel based on the signal input from the remote control, the selected channel is accessed by access control circuitry; audio/video decompression circuitry; video and audio multiplexers; upconverter for outputting RF signal to user's television (see col. 5, lines 49-60). In addition, Naiff discloses the telephone return port 64 of peripheral card 40 communicates to service provider using RF return path (see col. 8, lines 6-13) and peripheral card 40 communicates to the television using RF signal transmission (see col. 9, lines 19-42). However, Naiff fails to explicitly disclose the peripheral card 40 comprises frequency synthesizer generating the radio frequency signals.

Cirineo discloses a transmitter card comprises radio frequency synthesizer 30 generating the radio frequency signal (see figure 2). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Naiff to incorporate a radio frequency synthesizer in the transmitter card as taught by Cirineo in order to allow communications between devices using radio frequency thereby increase efficiency for the transmitter card.

Regarding claim 3, Naiff discloses application software in the PC controls various functions of the television interface card 40 via bus control 86; the application software also used to tune o channels requested by a user via the remote control 26 (see col. 6, lines 57-63 and figure 3). Inherently, the frequency generated by the frequency synthesizer is set by a controller on the circuit board.

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Regarding claim 4, Naiff discloses the application software control various functions of the television interface card 40 via bus controller 86 (see col. 6, lines 57-63 and figure 3). Inherently, the frequency generated by the frequency synthesizer is set by conveying instructions via the computer bus.

7. Claims 7, 18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Naiff (US 5,982,363).

Regarding claim 7, Naiff discloses a transmitter card as discussed in the rejection of claim 1. Naiff further discloses the application software in the PC controls the various functions of the television interface card 40, including generation of electronic program displays from data provided by the television system operator. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Naiff to modulate the transmitted signals according to a predetermined protocol in order to allow the devices in the network to communicate with each other.

Regarding claim 18, the elements of the method being claimed correspond to the elements of the card being claimed in claim 7 and are analyzed as discussed in the rejection of claim 7.

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8. Claims 8 and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Naiff (US 5,982,363) as applied to claim 1 above, and in view of Bock et al. (US 5,953,418).

Regarding claim 8, Naiff discloses a transmitter card as discussed in the rejection of claim 1. However, Naiff fails to disclose the modulation circuitry comprises an encoder which encodes error correction into the transmitted signals according to a predetermined protocol in accordance with a command conveyed to the card via the industry standard bus.

Bock et al. discloses signal processor 68 in transmitter card 62 comprises encoder (error correction 92) that encodes error correction into the transmitted signals (see figure 3). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Naiff to incorporate an encoder in transmitter card in order to allow the receiver to correct transmission errors.

Regarding claim 19, the elements of the method being claimed correspond to the elements of the card being claimed in claim 8 and are analyzed as discussed in the rejection of claim 8.

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9. Claims 9, 11-14, 20, and 22-23 are rejected under 35 U.S.C. 103(a) as being unpatentable over Naiff (US 5,982,363) as applied to claim 1 above, and in view of Goldman et al. (US 5,592,366).

Regarding claim 9, Naiff discloses a transmitter card as discussed in the rejection of claim 1. However, Naiff fails to disclose the card comprises an auxiliary connector through which the card is coupled to at least one other card located in the computer such that signals pass between the cards without passing through the industry standard bus.

Goldman et al. discloses the card comprises an auxiliary connector through which the card is coupled to at least one other card located in the computer such that signals pass between the cards without passing through the industry standard bus (see col. 4, lines 51-57). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Naiff to incorporate an auxiliary connector in the transmitter card as taught by Goldman et al. in order to have transmitter card communicate directly to the other cards thereby increase efficiency of the system.

Regarding claim 11, the claim limitations of the radio frequency communication card correspond to the claim limitations of the transmitter card in claim 9 and are analyzed as discussed in the rejection of claim 9.

Regarding claim 12, Goldman et al. discloses the transmitter card is coupled to a receiver card. The receiver card receives the bus signals from the transmitter card and routes them to the backplane (see col. 4, lines 51-57). Therefore, it would have been obvious to one of ordinary skill in the art that the communication card convey a synchronizing signal via the auxiliary connect in order to increase efficiency of the system.

Regarding claim 13, Naiff in view of Goldman discloses a transceiver satellite as discussed in the rejection of claim 11. Goldman further discloses the transmitter card and receiver card can be installed in the host computer in available ISA slots (see col. 4, lines 51-57).

Regarding claim 14, Naiff discloses the transmitter card is coupled to the receiver card by a pair of shielded cables (see col. 4, lines 51-57). Inherently, the transmitter card and the receiver card comprise respective connectors coupling the cards to the auxiliary bus.

Regarding claim 20, the elements of the method being claimed correspond to the elements of the card being claimed in claim 9 and are analyzed as discussed in the rejection of claim 9.

Regarding claim 22, the elements of the method being claimed correspond to the elements of the transceiver being claimed in claim 13 and are analyzed as discussed in the rejection of claim 13.

Regarding claim 23, the elements of the method being claimed correspond to the elements of the transceiver being claimed in claim 14 and are analyzed as discussed in the rejection of claim 14.

Conclusion

10. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Wugofski et al. (US 5,852,437) discloses a personal computer peripheral device 180 comprises receiver, transmitter, antenna, tuner, decoder, encoder (see figure 3).

Pirie (US 5,247,489) discloses personal computer 34 comprising receiver card 36, DSP card 38, transmitter card 40 (see figure 2).

Koppa (US 6,088,746) discloses an expansion card 1 comprises transmitter and receiver wherein the transmitter comprises modulator, filter, mixer in which the

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modulated signal is mixed to a local oscillator frequency for creating a radio frequency signal and a power amplifier for amplifying the signal to be sent (see col. 1, lines 55-61).

Jones et al. (US 6,108,314) discloses a wireless router 30 comprises receiver card and transmitter card (see figure 2).

Rudow et al. (US 5,878,369) discloses transceiver unit comprises transmitter card and receiver card (see col. 34, lines 45-65).

Singkornrat et al. (US 6,128,484) discloses wireless transceiver for remotely controlling a computer.

Gaucher (US 6,405,261) discloses method and apparatus for an automatic multi-rate wireless/wired computer network.

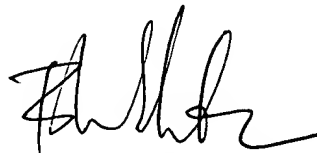
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Son P Huynh whose telephone number is 703-305-1889. The examiner can normally be reached on 8:00-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Andrew Faile can be reached on 703-305-4380. The fax phone numbers for the organization where this application or proceeding is assigned are 703-872-9314 for regular communications and 703-872-9314 for After Final communications.

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Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the customer service office whose telephone number is 703-306-0377.

Son P. Huynh
August 28, 2002



Bhavesh Mehta
Primary Examiner